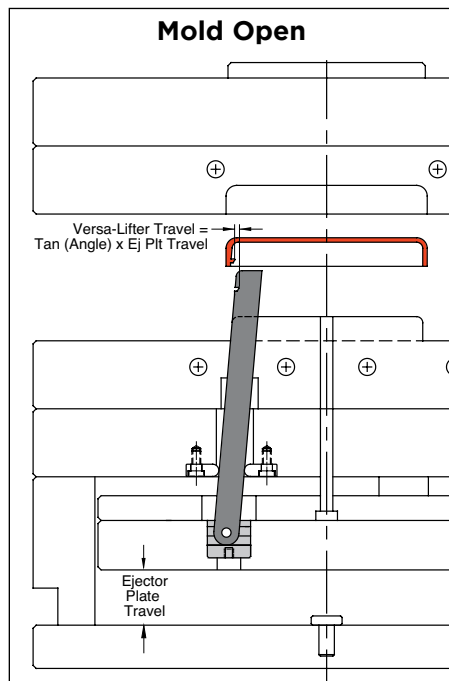
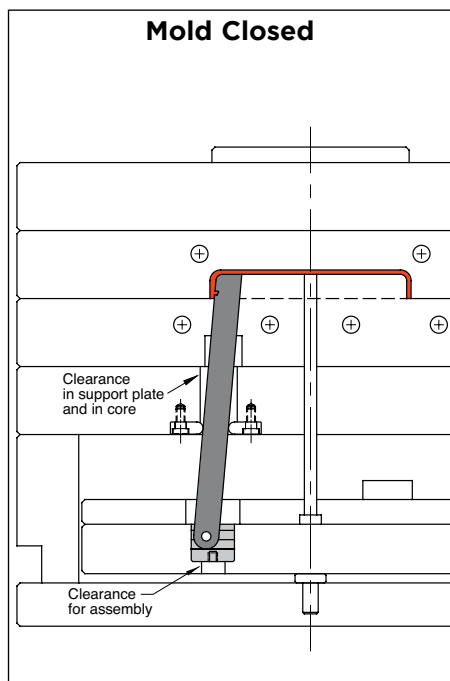
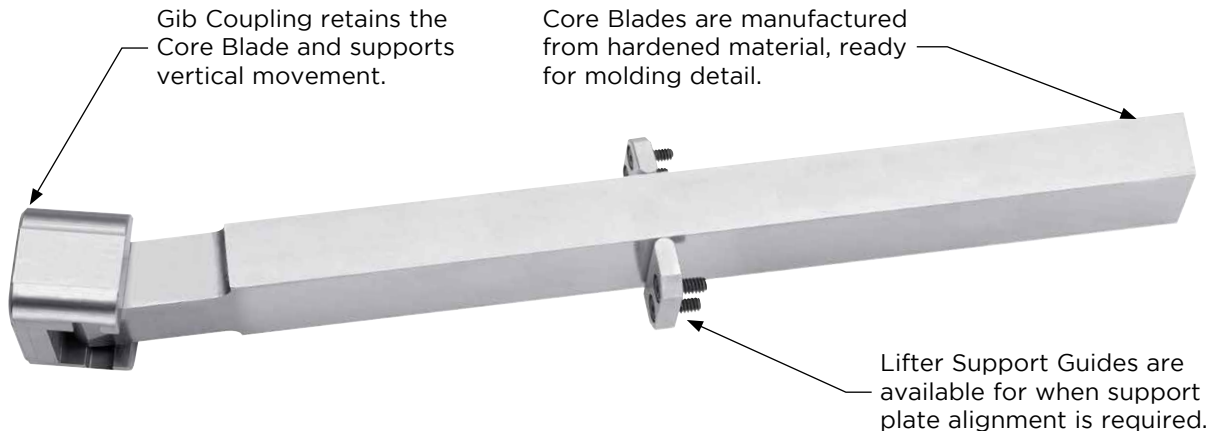




VERSA-LIFTER™ UNDERCUT RELEASE SYSTEM

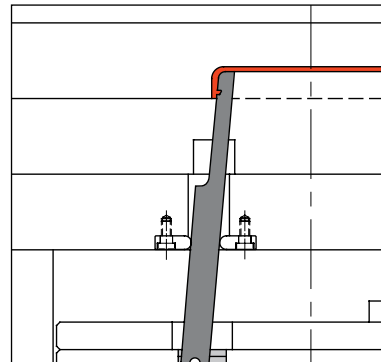
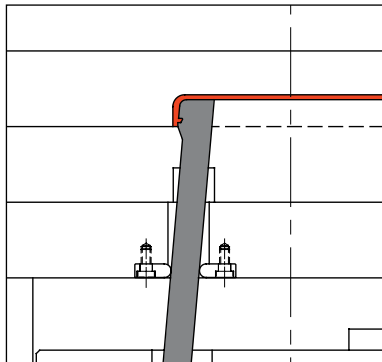


APPLICATION GUIDELINES

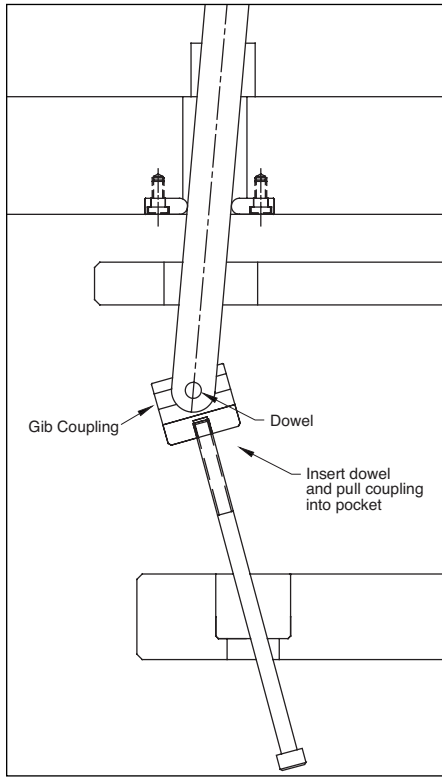
- Typical angles are 5-10°, but users have reported success at larger angles for unique applications with greater bearing, such as cavity side core pulls. Contact tech@procomps.com for an application review.
- Guided Ejection is required, and the Lifter Support Guides are recommended in all applications. (See page H-10)
- Recommended total clearance is .001"-.0015" (.025-.038mm) where permissible.
- Core material should be at least 10 HRC different than the Core Blade material.
- Locking angles can be designed to counter molding pressure.
- Made-to-order Core Blades can be provided by sending a request to tech@procomps.com.

Design Options

- For positive return, a locking angle can be designed into the Core Blade as shown at right.
- In addition, if space is limited at parting line, the Core Blade can be stepped.



VERSA-LIFTER™
CORE BLADES

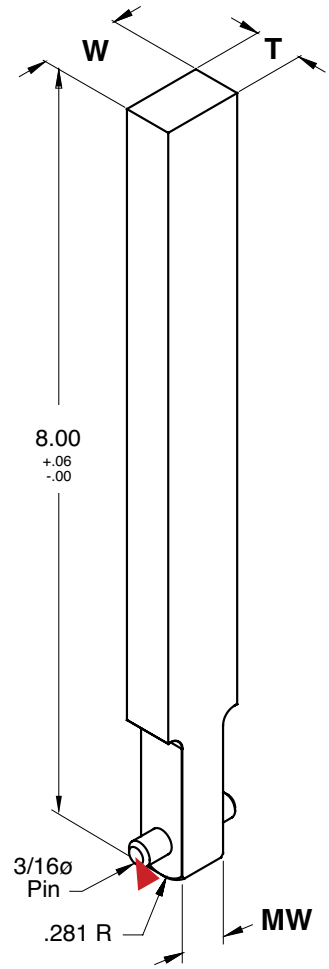


M Bohler K340 **H** 58-60 HRC

CATALOG NUMBER	T +.0000 -.0003	W +.0000 -.0003	MW +.000 -.001
CBV50X18L8	.5000	.1875	.188
CBV50X43L8		.4375	.188
CBV50X62L8		.6250	.375
CBV50X87L8		.8750	.625
CBV50X112L8		1.1250	.875

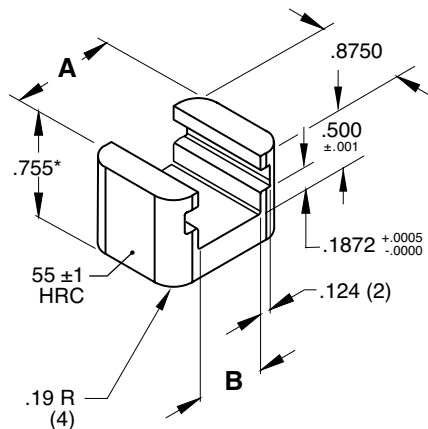
APPLICATION GUIDELINES

- Assembly length cap screw (#10-32 x 4") and Dowel Pin is included with each Gib Coupling, sold separately below.
- Install the assembly screw in the Gib Coupling as shown.
- Connect the lifter pin and pull unit into pocket in ejector plate, removing the screw afterwards.
- Lifter Guides are shown on page H-10.



▶ CAD insertion point

GIB COUPLINGS

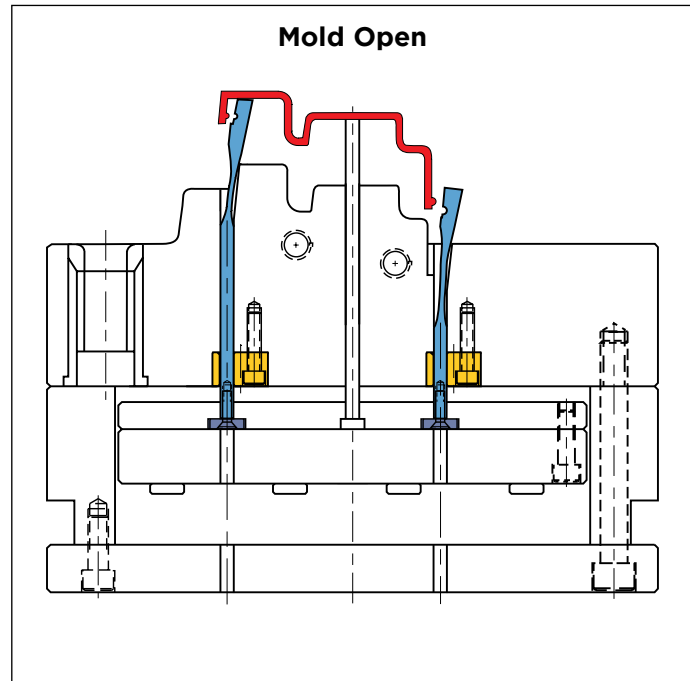
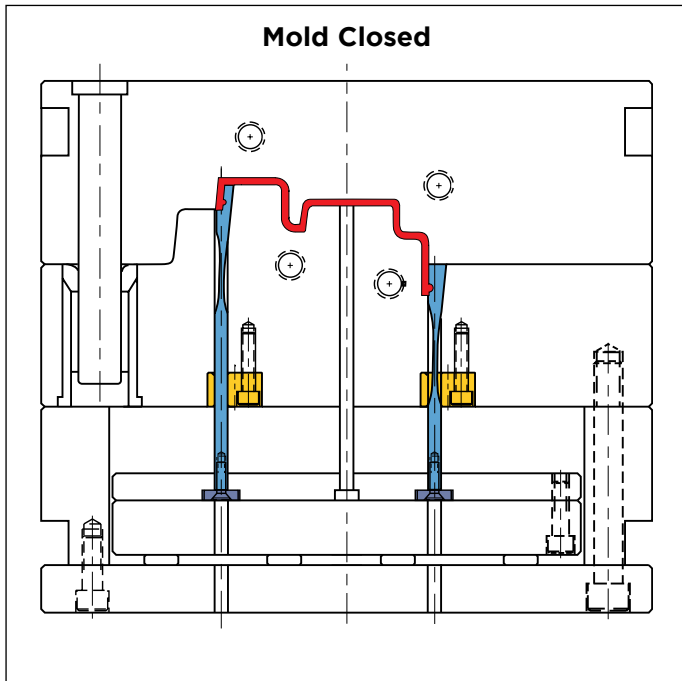
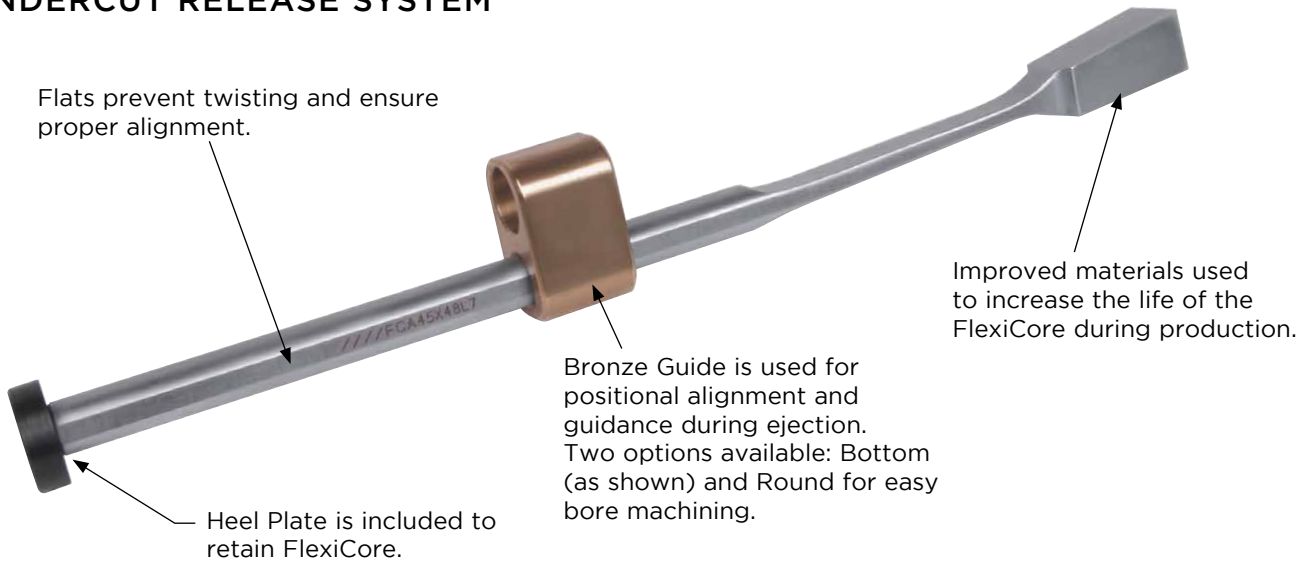


M S-7 **H** 54-56 HRC **S** Salt Bath Nitride

CATALOG NUMBER	A CENTRAL	B +.001 -.000	COMPATIBLE CORE BLADE WIDTHS (W)
UGV68	.6860	.190	.1875 & .4375
UGV87	.8735	.377	.6250
UGV112	1.1235	.627	.8750
UGV137	1.3735	.877	1.1250

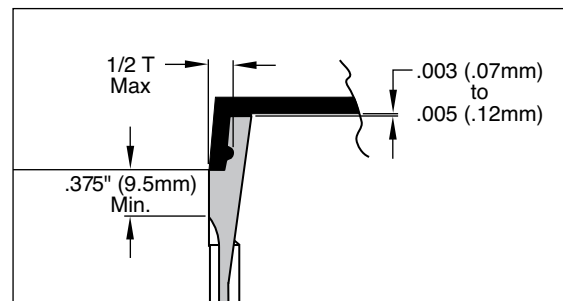
* .005" stock is included on the bottom for fitting.
Includes #10-32 x 4" long screw.

FLEXICORE™
UNDERCUT RELEASE SYSTEM



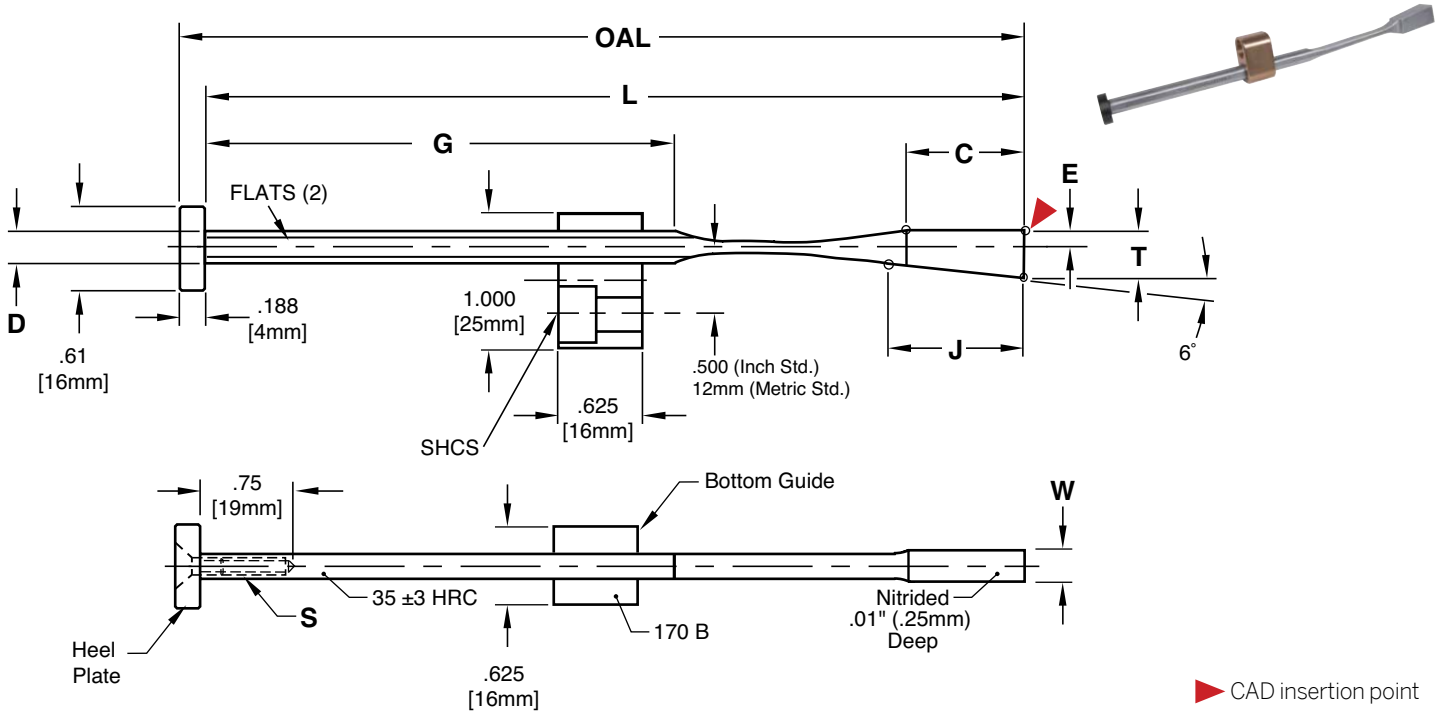
APPLICATION GUIDELINES

- The FlexiCore diameter (D) must be within the Guide prior to ejection as shown above.
- Only surface treatments applied at low temperatures such as Electroless Nickel-based or chromium deposition treatments are permitted.
- Maximum temperature is 250°F (125°C).
- FlexiCore Assembly includes: FlexiCore, Bronze Guide (Bottom or Round), Heel Plate, and Flat Head Cap Screw.
- Please contact tech@procomps.com to review any designs if questions arise or if your application differs from the examples shown.





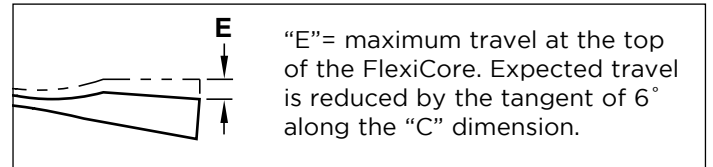
FLEXICORE™ BOTTOM GUIDE ASSEMBLY



▶ CAD insertion point

APPLICATION GUIDELINES

- The FlexiCore can be cut down and re-tapped to accommodate specific applications.
- Assemblies include FlexiCore, Bottom Guide, Heel Plate, and Flat Head Cap Screw.
- Assembly components also sold individually on page H-23.



Inch Standard

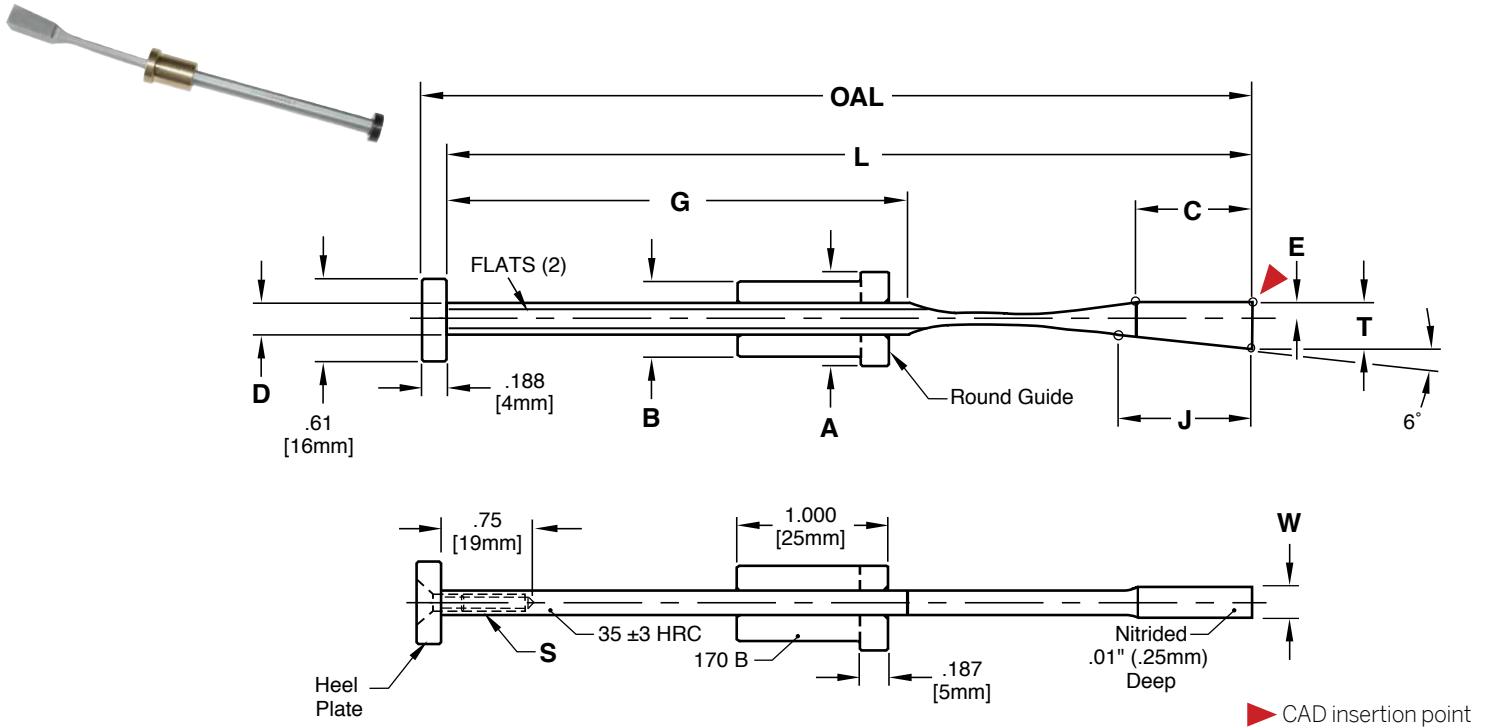
M FlexiCore: AISI 4340 with thin, dense Chromium treatment, Guide: CA954 Solid Bronze, Heel Plate: AISI 1018

CATALOG NUMBER	T +.002 -.000	W +.002 -.000	L +.010 -.000	OAL REF	D +.000 -.001	C ±.015	E	G +.01 -.00	J	S (INCLUDED)	SHCS
FCA35X24L6	.354	.244	6.400	6.588	.234	.875	.137	3.49	.957	#8-32 x 3/8	1/4-20
FCA35X32L6	.354	.322	6.400	6.588	.250	.875	.137	3.48	.957	#8-32 x 3/8	1/4-20
FCA45X40L7	.453	.401	7.875	8.062	.312	1.000	.177	4.38	1.025	#10-24 x 1/2	1/4-20
FCA45X48L7	.453	.480	7.875	8.062	.312	1.000	.177	4.38	1.025	#10-24 x 1/2	1/4-20

Metric Standard

CATALOG NUMBER	T +.05 -.00	W +.05 -.00	L +.25 -.00	OAL REF	D +.000 -.025	C ±.35	E	G +.25 -.00	J	S (INCLUDED)	SHCS
FCA9X6L160	9	6.2	162.5	166.5	5.94	22	3.5	88.6	24.3	M4-0.7 x 12	M6-1
FCA9X8L160	9	8.2	162.5	166.5	6.35	22	3.5	88.4	24.3	M4-0.7 x 12	M6-1
FCA11X10L200	11.5	10.2	200.0	204.0	7.92	26	4.5	111.2	26.0	M5-0.8 x 14	M6-1
FCA11X12L200	11.5	12.2	200.0	204.0	7.92	26	4.5	111.2	26.0	M5-0.8 x 14	M6-1
FCA12X14L200	12.5	14.2	200.0	204.0	7.92	30	4.5	107.2	28.5	M5-0.8 x 14	M6-1
FCA12X16L200	12.5	16.2	200.0	204.0	7.92	30	4.5	107.2	28.5	M5-0.8 x 14	M6-1

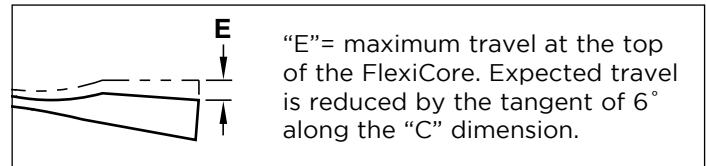
FLEXICORE™ ROUND GUIDE ASSEMBLY



▶ CAD insertion point

APPLICATION GUIDELINES

- The FlexiCore can be cut down and re-tapped to accommodate specific applications.
- Assemblies include FlexiCore, Round Guide, Heel Plate, and Flat Head Cap Screw.
- Assembly components also sold individually on page H-23.



Inch Standard

M FlexiCore: AISI 4340 with thin, dense Chromium treatment, Guide: CA954 Solid Bronze, Heel Plate: AISI 1018

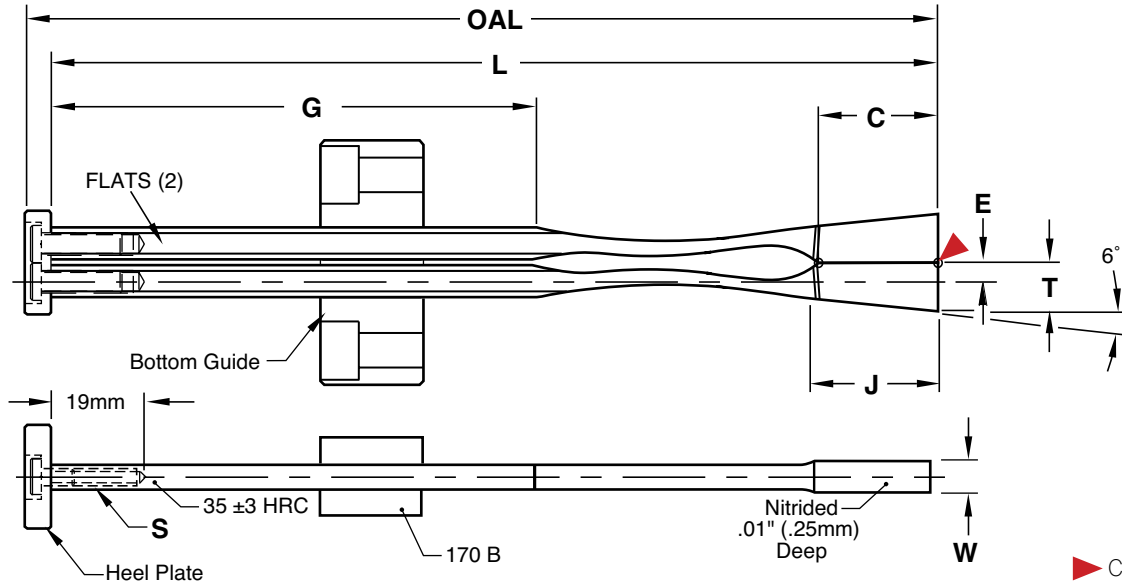
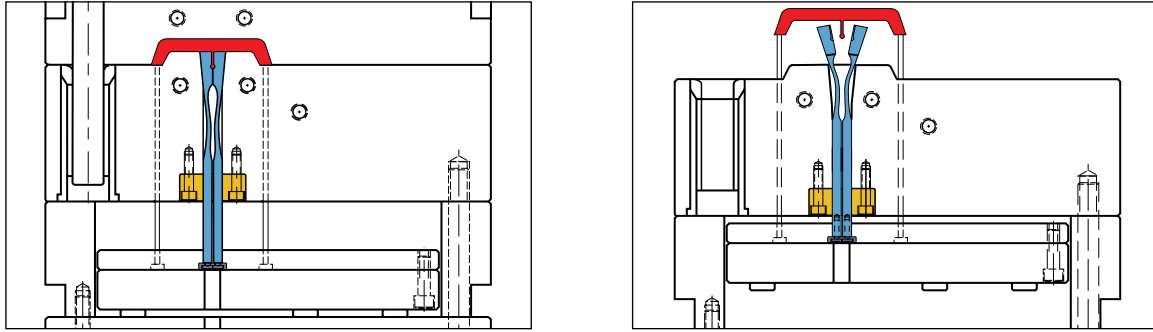
CATALOG NUMBER	T +.002 -.000	W +.002 -.000	L +.010 -.000	OAL REF	D +.000 -.001	C ± .015	E	G +.01 -.00	J	S (INCLUDED)	A	B
FCR35X24L6	.354	.244	6.400	6.588	.234	.875	.137	3.49	.957	#8-32 x 3/8	.625	.500
FCR35X32L6	.354	.322	6.400	6.588	.250	.875	.137	3.48	.957	#8-32 x 3/8	.625	.500
FCR45X40L7	.453	.401	7.875	8.062	.312	1.000	.177	4.38	1.025	#10-24 x 1/2	.750	.625
FCR45X48L7	.453	.480	7.875	8.062	.312	1.000	.177	4.38	1.025	#10-24 x 1/2	.750	.625

Metric Standard

CATALOG NUMBER	T +.05 -.00	W +.05 -.00	L +.25 -.00	OAL REF	D +.000 -.025	C ±.35	E	G +.25 -.00	J	S (INCLUDED)	A	B
FCR9X6L160	9	6.2	162.5	166.5	5.94	22	3.5	88.6	24.3	M4-0.7 x 12	16	12
FCR9X8L160	9	8.2	162.5	166.5	6.35	22	3.5	88.4	24.3	M4-0.7 x 12	16	12
FCR11X10L200	11.5	10.2	200.0	204.0	7.92	26	4.5	111.2	26.0	M5-0.8 x 14	20	16
FCR11X12L200	11.5	12.2	200.0	204.0	7.92	26	4.5	111.2	26.0	M5-0.8 x 14	20	16
FCR12X14L200	12.5	14.2	200.0	204.0	7.92	30	4.5	107.2	28.5	M5-0.8 x 14	20	16
FCR12X16L200	12.5	16.2	200.0	204.0	7.92	30	4.5	107.2	28.5	M5-0.8 x 14	20	16



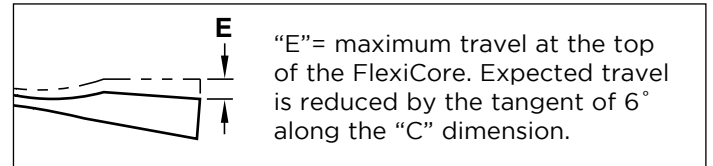
FLEXICORE™ DOUBLE ACTUATION



▶ CAD insertion point

APPLICATION GUIDELINES

- The FlexiCore can be cut down and re-tapped to accommodate specific applications.
- Assemblies include two FlexiCores, one Bottom Guide, one Heel Plate, and two Low Head Cap Screws.
- Assembly components also sold individually on page H-23.



Inch Standard

M FlexiCore: AISI 4340 with thin, dense Chromium treatment, Guide: CA954 Solid Bronze, Heel Plate: AISI 1018

CATALOG NUMBER	T +.002 -.000	W +.002 -.000	L +.010 -.000	OAL REF	D +.000 -.001	C ±.015	E ±.015	G +.01 -.00	J +.01 -.00	S (INCLUDED-2)
FCDA35X24L6	.354	.244	6.400	6.588	.234	.875	.137	3.49	.957	#8-32 x 3/8
FCDA45X48L7	.453	.480	7.875	8.062	.312	1.000	.177	4.38	1.025	#10-24 x 1/2

Metric Standard

CATALOG NUMBER	T +.05 -.00	W +.05 -.00	L +.25 -.00	OAL REF	D +.000 -.025	C ±.035	E 015	G +.25 -.00	J +.01 -.00	S (INCLUDED-2)
FCDA9X6L160	9	6.2	162.5	166.5	5.94	22	3.5	88.6	24.3	M4-0.7 x 12
FCDA11X12L200	11.5	12.2	200.0	204.0	7.92	26	4.5	111.2	26.0	M5-0.8 x 14
FCDA12X14L200	12.5	14.2	200.0	204.0	7.92	30	4.5	107.2	28.5	M5-0.8 x 14
FCDA12X16L200	12.5	16.2	200.0	204.0	7.92	30	4.5	107.2	28.5	M5-0.8 x 14

FLEXICORE™ ACCESSORIES

WEAR BLOCKS

Inch Standard

M P-20 Pre-Hard **H** Nitrided .005" Deep

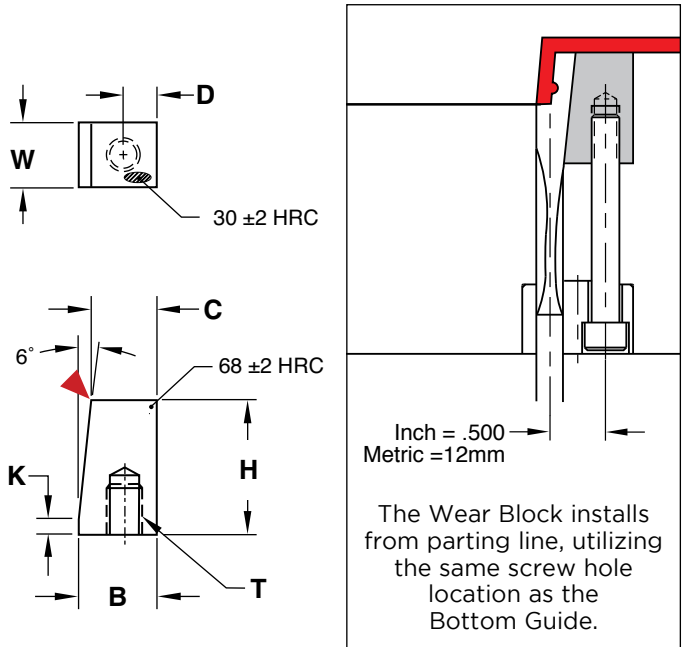
CATALOG NUMBER	W +.002 -.000	D ±.01	B +.001 -.000	C +.001 -.000	H	K	T THREAD
FCWB-24	.244	.250	.626	.533	1.000	.115	#10-24
FCWB-32	.322	.250	.626	.533	1.000	.115	1/4-20
FCWB-40	.401	.250	.567	.474	1.000	.115	1/4-20
FCWB-48	.480	.250	.567	.474	1.000	.115	1/4-20

Note: FCWB-24 is designed for use with a 1/4Ø shoulder bolt.

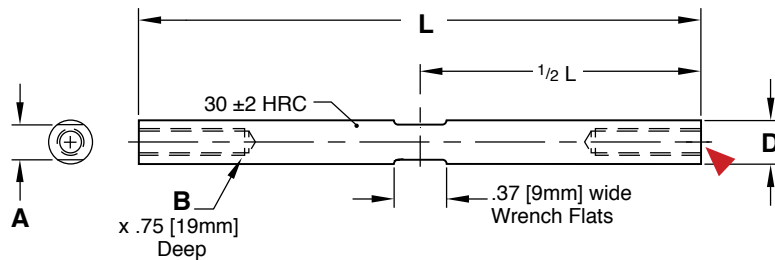
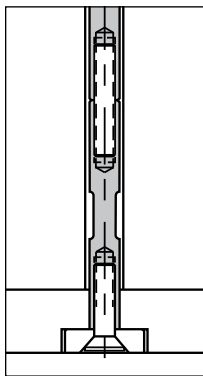
Metric Standard

CATALOG NUMBER	W +.05 -.00	D ±.25	B +.025 -.000	C +.025 -.000	H	K	T THREAD
FCWBM-6	6.2	7.2	15.9	13.55	25.4	2.9	M5-0.8
FCWBM-8	8.2	7.2	15.9	13.55	25.4	2.9	M6-1
FCWBM-10	10.2	7.2	14.4	12.05	25.4	2.9	M6-1
FCWBM-12	12.2	7.2	14.4	12.05	25.4	2.9	M6-1
FCWBM-14	14.2	8.0	15.2	12.11	33.2	3.5	M6-1
FCWBM-16	16.2	8.0	15.2	12.11	33.2	3.5	M6-1

▶ CAD insertion point



EXTENSIONS



Inch Standard

M 4140 Pre-Hard

D +.000 -.005	B	A	L +.01 -.00	
			2"	4"
.232	#8-32	.187	FCX8L2	FCX8L4
.310	#10-24	.250	FCX10L2	FCX10L4

Metric Standard

M 4140 Pre-Hard

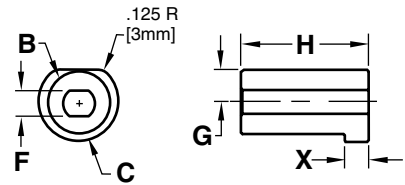
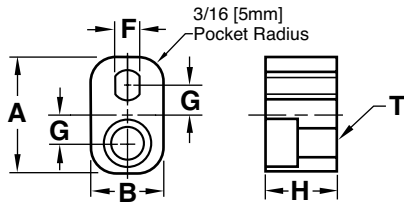
▶ CAD insertion point

D +.00 -.12	B	A	L +.25 -.00	
			50MM	100MM
6	M4-7	4.8	FCXM4L50	FCXM4L100
8	M5-8	6.3	FCXM5L50	FCXM5L100

Includes threaded stud for attachment to FlexiCore.



FLEXICORE™ ACCESSORIES REPLACEMENT GUIDES



Bottom Guides: Inch/Metric Standard

M CA954 Solid Bronze

CATALOG NUMBER	A	B	H	F	G	T
FCBG-24	1.000	.625	.625	.190	.250	1/4-20
FCBG-32	1.000	.625	.625	.200	.250	1/4-20
FCBG-40	1.000	.625	.625	.290	.250	1/4-20
FCBG-6	25	16	16	4.8	6	M6-1
FCBG-8	25	16	16	5.0	6	M6-1
FCBG-10	25	16	16	7.3	6	M6-1

Screws included.

Round Guides: Inch/Metric Standard

M CA954 Solid Bronze

CATALOG NUMBER	B	C	H	F	X	G
FCRG-24	.5000	.625	1.000	.190	.187	.250
FCRG-32	.5000	.625	1.000	.200	.187	.250
FCRG-40	.6250	.750	1.000	.290	.187	.312
FCRG-6	12	16	25	4.8	5	6
FCRG-8	12	16	25	5.0	5	6
FCRG-10	16	20	25	7.3	5	8

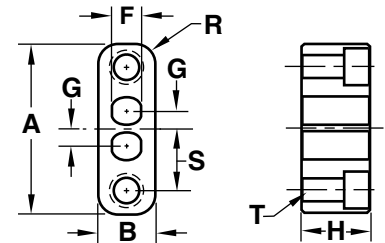
Screws included.

Double Actuation: Inch/Metric Standard

M CA954 Solid Bronze

CATALOG NUMBER	A	B	H	F	G	R	S	T
FCDBG-24	1.750	.625	.750	.190	.136	.218	.636	1/4-20
FCDBG-48	1.875	.625	.750	.290	.176	.218	.676	1/4-20
FCDBG-6	45	16	20	4.8	3.5	5	15.5	M6-1
FCDBG-12	48	16	20	7.3	4.5	5	16.5	M6-1

Screws included.



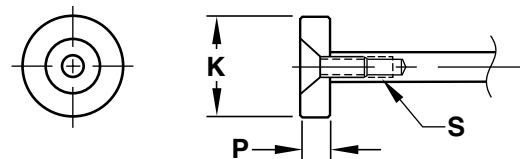
REPLACEMENT HEEL PLATES

Inch/Metric Standard

M 4140 Pre-Hard **H** Black Oxide

CATALOG NUMBER	K	P	S (INCLUDED)
FCHP-8	.61	.188	#8-32 x 3/8
FCHP-10	.61	.188	#10-24 x 1/2
FCHP-4	16	4	M4-0.7 x 12
FCHP-5	16	4	M5-0.8 x 14

Screws included.



Double Actuation: Inch/Metric Standard

M 4140 Pre-Hard **H** Black Oxide

CATALOG NUMBER	C	K	P	S (INCLUDED)
FCDHP-8	.272	.750	.188	#8-32 x 3/8
FCDHP-10	.352	.875	.188	#10-24 x 1/2
FCDHP-4	7	20	6	M4-0.7 x 12
FCDHP-5	9	22	6	M5-0.8 x 14

Screws included.

